

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION II

2/28/92

-----X
IN THE MATTER OF THE)
WARWICK LANDFILL SUPERFUND SITE)

)
Ford Motor Company,)
Georgia-Pacific Corporation,)
I.S.A. in New Jersey, Inc.,)
Round Lake Sanitation Corporation,)
Union Carbide Corporation,)
Town of Warwick,)
Respondents.)

U.S. EPA
Index Number
II CERCLA - 20203

)
Proceeding Under Section 106(a) of the)
Comprehensive Environmental Response,)
Compensation, and Liability Act of 1980,)
as amended (42 U.S.C. § 9606(a)).)
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ADMINISTRATIVE ORDER
FOR REMEDIAL DESIGN AND REMEDIAL ACTION

366582



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ADMINISTRATIVE ORDER
FOR REMEDIAL DESIGN AND REMEDIAL ACTION

I. INTRODUCTION AND JURISDICTION

1. This Order directs Ford Motor Company, Georgia-Pacific Corporation, I.S.A. in New Jersey, Inc., Round Lake Sanitation Corporation, Union Carbide Corporation, and the Town of Warwick (hereinafter collectively referred to as "Respondents") to perform the remedial design for the remedy described in the Record of Decision ("ROD") for the Warwick Landfill Superfund Site located in the Town of Warwick, New York (hereinafter referred to as the "Site") dated June 27, 1991 and to implement the design by performing the remedial action. This Order is issued to Respondents by the United States Environmental Protection Agency ("EPA") under the authority vested in the President of the United States by Section 106(a) of the Comprehensive Environmental Response, Compensation and Liability Act ("CERCLA"), 42 U.S.C. § 9606(a). This authority was delegated to the Administrator of EPA on January 23, 1987, by Executive Order 12580 (52 Fed. Reg. 2926, January 29, 1987), and was further delegated to EPA Regional Administrators on September 13, 1987 by EPA Delegation No. 14-14-B.

II. FINDINGS OF FACT

2. The Site is located approximately one and one-half miles northeast of the Village of Greenwood Lake in the Town of Warwick in Orange County, New York. The Site includes an approximately thirteen acre landfill mound situated on a former 25-acre leasehold parcel. The Site is approximately three-fourths of a mile north of State Route 17A and fronts Penaluna Road on its western boundary between Old Tuxedo Road and Old Dutch Hollow Road.

3. The area surrounding the Site is generally wooded with clusters of residential homes, all of which utilize private wells as their source of drinking water. The two homes closest to the Site are approximately 250 feet southwest of the landfill boundary and 300 feet northeast of the landfill boundary, respectively.

4. Contiguous to the landfill mound at the Site are two wetland areas: an emergent marsh/scrub-shrub wetland, approximately nine acres in size, in the southeast, and a smaller, palustrine, forested scrub-shrub deciduous wetland, approximately three to four acres in size, to the northwest.

5. An unnamed intermittent stream drains the small wetlands area on the northwest side of the Site and flows north into a creek that flows westward and then southward into Greenwood Lake.

Another stream, located on the landfill's southeast side, flows southward into the larger wetlands area which is drained by an unnamed perennial stream that flows south and west into Greenwood Lake. Greenwood Lake is designated as a Class "A" water body by the New York State Department of Environmental Conservation ("NYSDEC"). The wetlands and streams draining the Site provide habitat for small aquatic wildlife, such as frogs and turtles.

6. Two aquifers exist beneath the Site, an overburden aquifer and a bedrock aquifer. Groundwater in both the overburden and bedrock aquifers appears to discharge into the southeastern wetland which lies adjacent to the landfill.

7. The Site was owned by the Penaluna family from 1898 to 1984. The Site was leased from the Penaluna family and operated as a municipal landfill by the Town of Warwick from the mid 1950s to 1977. During that period of time, CERCLA hazardous substances were disposed of at the Site.

8. Between 1977 and its closure in 1980, the Site was leased from the Penaluna family by Grace Disposal and Leasing, Ltd. and was operated as a landfill. During this period of time, CERCLA hazardous substances were disposed of at the Site.

9. Respondents Ford Motor Company, Georgia Pacific Corporation, and Union Carbide Corporation are parties who arranged for the treatment or disposal of hazardous substances that were disposed of at the Site. The Town of Warwick was an operator of the Site during a portion of the period when hazardous substances were disposed of there. Respondents I.S.A. in New Jersey, Inc. and Round Lake Sanitation Corporation accepted hazardous substances for transport to the Site for disposal.

10. In 1985, the Site was proposed for inclusion on the National Priorities List ("NPL"), 40 CFR Part 300, Appendix B, which has been issued pursuant to Section 105(a)(8)(B) of CERCLA, 42 U.S.C. § 9605(a)(8)(B). The Site was formally listed on the NPL in 1989.

11. On December 28, 1988, EPA sent special notice letters to Respondents and other parties pursuant to Section 122(e) of CERCLA, notifying them of their potential liability, and inviting them to agree to perform a Remedial Investigation and Feasibility Study ("RI/FS") at the Site. Since no good faith offers were received to undertake the RI/FS, EPA contracted with Ebasco Services, Inc. for performance of the work pursuant to financing from the Superfund (the "Fund").

12. During the RI sampling, CERCLA hazardous substances exceeding Federal and/or State maximum contaminant levels were detected in both aquifers. In the overburden aquifer, at the monitoring well located immediately adjacent to the northwest boundary of the landfill, the volatile organic compounds ("VOCs")

chloromethane and trichloroethene, were detected at levels which exceeded State maximum contaminant levels ("MCLs"). Ten of the twenty-two metals detected in the overburden wells exceeded State MCLs. Additionally, two metals (antimony and beryllium) detected in the overburden aquifer exceeded Federal proposed maximum contaminant level goals ("MCLGs") and nickel exceeded the Federal proposed MCL.

13. In the on-Site and downgradient bedrock groundwater, benzene, chloromethane, 1,4-dichlorobenzene, ethylbenzene, isopropylbenzene and total xylenes were detected at levels which exceeded MCLs. Six metals: barium, chromium, iron, lead, manganese and mercury exceeded State MCLs; antimony exceeded the Federal proposed MCLG of 3.0 ug/l and nickel exceeded the Federal proposed MCL of 100 ug/l.

14. During sampling by EPA and the New York State Department of Health ("NYSDOH") of forty-two area residential wells, VOCs were detected at levels exceeding State and/or Federal MCLs in three residential wells located northeast of the Site. All wells are believed to be bedrock wells drilled to significant depths (>200 feet). Residential Well ("RW") 04, which is within 300 feet of the northeastern edge of the Site, showed the highest level of residential well contamination and exceeded State MCLs for 1,1,1,-trichloroethane and 1,1-dichloroethane, and both the State and Federal MCL for 1,1-dichloroethene. The pumping of residential wells may induce the flow of contaminants from the landfill towards these wells through bedrock fractures.

15. In surface water sampling, VOCs were detected at levels which exceeded State surface water quality standards. In particular, chlorobenzene, phenol and 4-methyl phenol were detected at levels above State surface water quality standards. The PCB compound aldrin was detected at one location above State surface water quality standards and nine metals: aluminum, barium, cobalt, iron, lead, magnesium, manganese, vanadium and zinc were detected above State surface water quality standards.

16. Sediment sampling detected the presence of contamination by phthalate and PAH compounds. Additionally, all on-Site wetland metal results exceeded Site background concentrations.

17. Soil sampling of both the unsaturated and saturated zone soils indicated the presence of several volatile organic compounds of concern. Antimony and lead were also detected in soil samples at concentrations which exceeded off-Site background concentrations.

18. Due to analytical results obtained during the performance of this RI/FS, EPA determined that the remediation of the Site should be accomplished by dividing the Site into two operable units. Operable unit 1 ("OU 1") is concerned, inter

alia, with controlling the source of the contamination, by capping the landfill and implementing point-of-use treatment for residential wells surrounding the Site which show contamination exceeding State or Federal MCLs. Operable unit 2 ("OU 2") will further characterize the fate and transport of the contaminants and will serve as the basis for a final groundwater remedy.

19. The RI/FS for OU 1 was completed in February 1991. EPA held a public comment period on the proposed remedial action plan for OU 1. On June 27, 1991, EPA issued a ROD in which a remedy was selected for OU 1. The major components of the selected remedy are: (a) capping of the landfill in accordance with 6 NYCRR Part 360 closure requirements for New York State solid waste landfills; (b) development and monitoring of landfill gas vents throughout the landfill mound; (c) development and implementation of a residential well sampling program; (d) provision of point-of-use treatment systems to local residential wells, as needed; (e) development and implementation of a groundwater monitoring program using existing monitoring wells as well as additional groundwater monitoring wells installed within the landfill mound; (f) construction of fencing around the perimeter of the 25-acre leasehold; (g) recommendations that institutional controls be established to ensure that future use of the Site property will maintain the integrity of the cap; and (h) measures to mitigate potential disturbance of adjacent wetlands.

20. The State of New York concurred on the remedy selected in the OU 1 ROD. The OU 1 ROD is supported by an administrative record that contains the documents and information upon which EPA based the selection of the response action.

21. On July 30, 1991, special notice letters were sent to the Respondents and other parties, inviting them to undertake the Remedial Design/Remedial Action ("RD/RA") for OU 1 at the Site. The statutory period for submission of a good faith offer expired on September 30, 1991. No good faith offers have been received from the Respondents or other parties.

22. Actual or threatened releases of hazardous substances from the Site, if not addressed by implementing the response actions selected in the ROD, may present an imminent and substantial endangerment to the public health, welfare or the environment.

III. CONCLUSIONS OF LAW

23. The Site is a "facility" as defined in Section 101(9) of CERCLA, 42 U.S.C. § 9601(9).

24. Respondents are "persons" as defined in Section 101(21) of CERCLA, 42 U.S.C. § 9601(21). Respondents are liable parties as defined in Section 107(a) of CERCLA, 42 U.S.C. § 9607(a), and are subject to this Order under Section 106(a) of CERCLA, 42 U.S.C. § 9606(a).

25. The substances listed in paragraphs 12 through 17 are found at the Site and are "hazardous substances" as defined in Section 101(14) of CERCLA, 42 U.S.C. § 9601(14). These hazardous substances have been released at and from the Site into the environment.

26. The past and present disposal and migration of hazardous substances at and from the Site are a "release" as defined in Section 101(22) of CERCLA, 42 U.S.C. § 9601(22).

27. The actions required by this Order are necessary to protect the public health, welfare, and the environment.

IV. NOTICE TO THE STATE

28. Notice of this Order has been given to NYSDEC in accordance with Section 106 of CERCLA, 42 U.S.C. § 9606.

V. DETERMINATION

29. Based on the FINDINGS OF FACT and CONCLUSIONS OF LAW set forth above and the entirety of the administrative record, the Regional Administrator has determined that the release or threatened release of hazardous substances from the Site may present an imminent and substantial endangerment to the public health or welfare or the environment.

VI. ORDER

30. Based on the foregoing, Respondents are hereby ordered, jointly and severally, to comply with the following provisions, all documents incorporated by reference into this Order, and all schedules and deadlines in this Order, attached to this Order, or incorporated by reference into this Order.

VII. DEFINITIONS

31. Unless otherwise expressly provided herein, terms used in this Order which are defined in CERCLA or in regulations promulgated under CERCLA shall have the meaning assigned to them

in CERCLA or its implementing regulations. Whenever terms listed below are used in this Order in attachments to or documents incorporated by reference into this Order, the following definitions shall apply:

A. "CERCLA" means the Comprehensive Environmental Response, Compensation, and Liability Act, as amended, 42 U.S.C. §9601 et seq.

B. "Day" means a calendar day unless expressly stated to be a working day. "Working day" shall mean a day other than a Saturday, Sunday, or Federal holiday. In computing any period of time under this Order, where the last day would fall on a Saturday, Sunday, or Federal Holiday, the period shall run until the close of business on the next working day.

C. "DEC" or "NYSDEC" means the New York State Department of Environmental Conservation.

D. "EPA" means the United States Environmental Protection Agency and any successor departments or agencies of the United States.

E. "Hazardous substance" shall have the meaning provided in Section 101(14) of CERCLA, 42 U.S.C. §9601(14).

F. "National Contingency Plan" or "NCP" means the National Oil and Hazardous Substances Pollution Contingency Plan promulgated under Section 105 of CERCLA, 42 U.S.C. §9605, published at 55 Fed. Reg. 8666 (1990), and codified at 40 C.F.R. Part 300, including any amendments thereto.

G. "Operation and Maintenance" or "O&M" means those activities required under this Order for the purpose of maintaining the effectiveness of the measures taken in the Remedial Action (as defined below) following the implementation of those measures.

H. "Party" or "Parties" means the United States of America and/or Respondents.

I. "Performance Standards" means those cleanup standards, standards of control, and other substantive requirements, criteria or limitations set forth in or referenced in the ROD or which are otherwise approved by EPA in writing during the course of the Work. Requirements promulgated or modified after the issuance of the ROD may become Performance Standards pursuant to Section 300.430(f)(1)(ii)(B) of the NCP.

J. "Record of Decision" or "ROD" or "OU 1 ROD" means the Record of Decision document issued by EPA on June 27, 1991 (and all attachments thereto) in which the remedy for the first operable unit at the Site was selected by the Regional

Administrator of EPA, Region II. The ROD is attached to this Order as Appendix I, and is incorporated herein by reference.

K. "Remedial Action" or "RA" means the remedy authorized by the ROD, as further delineated in this Order, and in the various EPA-approved plans referred to below.

L. "Remedial Design" or "RD" means those activities to be undertaken by Respondents to develop the final "Remedial Design Report" or "RD Report", including, but not limited to, the final plans and specifications and other components and requirements for the Remedial Action pursuant to the EPA-approved plans referred to below.

M. "Respondents" means Ford Motor Company, Georgia Pacific Corporation, I.S.A. in New Jersey, Inc., Round Lake Sanitation Corporation, Town of Warwick and Union Carbide Corporation.

N. "Response Costs" means all costs, including direct costs, indirect costs, and accrued interest, incurred or to be incurred by the United States pursuant to any provision of CERCLA with regard to the Site.

O. "Site" means the Warwick Landfill Superfund Site, located approximately one and one-half miles northeast of the Village of Greenwood Lake in the Town of Warwick, Orange County, New York. The Site includes an approximately 13-acre landfill mound situated on a former 25-acre leasehold parcel. The Site is approximately three-fourths of a mile north of State Route 17A and fronts Penaluna Road on its western boundary between Old Tuxedo Road and Old Dutch Hollow Road. The location of the Site is shown in Appendix I, attached hereto.

P. "State" means the State of New York.

Q. "Waste Material" means (1) any "hazardous substance" under Section 101(14) of CERCLA, 42 U.S.C. §9601(14); (2) any "pollutant or contaminant" under Section 101(33) of CERCLA, 42 U.S.C. §9601(33); (3) any "solid waste" under Section 1004(27) of RCRA, 42 U.S.C. §6903(27); and (4) any mixture containing any of the constituents noted in (1), (2) or (3), above.

R. "Work" means all work and other activities required by and pursuant to this Order, including, but not limited to, implementation and Operation and Maintenance of the Remedial Action, and the preparation of the schedules, plans and reports required hereunder to be submitted in connection therewith.

VIII. NOTICE OF INTENT TO COMPLY

32. Respondents shall provide, not later than five (5) days after the effective date of this Order, written notice to EPA's Remedial Project Manager ("RPM") stating whether they will comply with the terms of this Order. If Respondents do not unequivocally commit to perform the Work as provided by this Order, they shall be deemed to have violated this Order and to have failed or refused to comply with this Order. Respondents' written notice shall describe, using facts that exist on or prior to the effective date of this Order, any "sufficient cause" defenses asserted by Respondents under Sections 106(b) and 107(c)(3) of CERCLA. The absence of a response by EPA to the notice required by this paragraph shall not be deemed to be an acceptance of Respondents' assertions.

IX. PARTIES BOUND

33. This Order shall apply to and be binding upon Respondents and their directors, officers, employees, agents, successors and assigns. Respondents are jointly and severally responsible for carrying out all activities required by this Order. No change in the ownership, corporate status, or other control of Respondents shall alter any of the Respondents' responsibilities under this Order.

34. Respondents shall provide a copy of this Order to any prospective owners or successors before a controlling interest in Respondents' assets, property rights, or stock are transferred to the prospective owner or successor. Respondents shall provide a copy of this Order to each contractor, subcontractor, laboratory or consultant retained to perform any Work under this Order, within five (5) days after the effective date of this Order or on the date such services are retained, whichever date occurs later. Respondents shall also provide a copy of this Order to each person representing Respondents with respect to the Site or the Work and shall condition all contracts and subcontracts entered into hereunder upon performance of the Work in conformity with the terms and conditions of this Order. With respect to the activities undertaken pursuant to this Order, each contractor and subcontractor shall be deemed to be related by contract to the Respondents within the meaning of 107(b)(3) of CERCLA, 42 U.S.C. § 9607(b)(3). Notwithstanding the terms of any contract, Respondents are responsible to the United States for compliance with this Order and for ensuring that their contractors, subcontractors and agents comply with this Order, and perform any Work in accordance with this Order.

X. WORK TO BE PERFORMED

35. Respondents shall give EPA fourteen (14) days advance notice of all field activities to be performed pursuant to this Order.

36. All of the Work to be performed by Respondents pursuant to this Order shall be under the direction and supervision of a qualified professional engineer licensed in the State of New York (hereinafter, the "Supervising Contractor"), the selection of which shall be subject to approval by EPA. At least fourteen (14) days prior to the initiation of the Work, Respondents shall notify EPA, in writing, of the name, title, and qualifications, of the Supervising Contractor proposed to be used in carrying out the Work. If at any time Respondents propose to change their Supervising Contractor, Respondents shall notify EPA, in writing as above, and shall obtain approval from EPA before the new Supervising Contractor performs, directs or supervises any work under this Order.

37. EPA will notify Respondents in writing of its approval or disapproval of a proposed Supervising Contractor. If EPA disapproves of the selection of any contractor as Supervising Contractor, Respondents shall submit to EPA a list of contractors, including the qualifications of each contractor, that would be acceptable to them within thirty days of receipt of EPA's disapproval of the contractor previously selected. EPA will provide written notice of the names of the contractor(s) that it approves. Respondents may select any approved contractor from that list and shall notify EPA of the name of the contractor selected within 21 days of EPA's designation of approved contractors.

38. The work to be performed by Respondents pursuant to this Order shall, at a minimum, achieve the requirements of the ROD (including, but not limited to the Performance Standards) and be performed in a manner consistent with the ROD. Nothing in this Order or the plans or other documents required to be submitted pursuant to this Order, or EPA's approval of those plans or other documents, constitutes a warranty or representation of any kind by EPA that compliance with those plans and this Order will achieve the requirements of the ROD, and such compliance shall not foreclose EPA from seeking performance of additional work to achieve the Performance Standards or other requirements of the ROD.

39. As described in greater detail below in this Section and in the Statement of Work attached hereto as Appendix II, the Work shall include, without limitation:

A. Design, construction and operation and maintenance of a multi-layer cap consistent with New York State

closure requirements found at 6 NYCRR Part 360, including any necessary design and field studies;

B. Regrading and compaction of the landfill mound at the Site to provide a stable foundation for the placement of the cap prior to its construction;

C. Performance of air monitoring prior to, during, and following construction at the Site, to ensure that air emissions resulting from the cap construction meet applicable or relevant and appropriate air emission requirements;

D. Collection of data to allow EPA to calculate a baseline risk assessment for the air pathway during the design phase of the cap;

E. Testing and characterization of landfill gas emissions. Based on these results, a gas venting system, either passive or active, to be determined by EPA, will be designed and constructed;

F. Installation of groundwater monitoring wells within the landfill mound;

G. Quarterly groundwater monitoring program using existing groundwater monitoring wells and newly installed wells within the mound. Groundwater monitoring will be conducted during and after completion of the remediation, as determined appropriate by EPA, to observe the effects of the cap on area groundwater flow patterns;

H. Construction of fencing around the perimeter of the 25-acre leasehold;

I. Implementation of a residential well sampling program of residential wells in the vicinity of the Site. Wells will be sampled on a semi-annual basis, at a minimum, until a final groundwater remedy is implemented under the second operable unit ("OU2");

J. Based on the results of the residential well sampling program conducted pursuant to subparagraph I., above, fitting and maintenance of granular activated carbon units on residential wells where sampling data indicates contaminant levels in exceedance of either Federal or State maximum contaminant levels ("MCLs") until a final groundwater remedy is implemented under OU2; and

K. Evaluation and delineation of the northwestern and southeastern wetlands and the drainage channels flowing through these wetlands adjacent to the landfill.

REMEDIAL DESIGN

40. Within sixty (60) days of the effective date of this Order, Respondents shall submit to EPA for review and approval a detailed plan (hereinafter, the "Remedial Design Work Plan" or "RD Work Plan") for design of the remedy set forth in the ROD (Appendix I) and for implementing activities which are necessary for the proper completion of the remedial design ("RD") (e.g., RD sampling and analysis).

A. The RD Work Plan shall include, but not necessarily be limited to, the following:

1. A Sampling, Analysis, and Monitoring Plan ("SAMP"). The SAMP shall include, without limitation:

a. Groundwater. A plan for sampling and analyzing groundwater to determine fate and transport of contaminants beneath and beyond the landfill. The plan shall include quarterly sampling of selected existing groundwater monitoring wells, as determined by EPA, as well as wells installed in the landfill mound during the Remedial Action;

b. Air. A plan for air monitoring during the regrading and compaction of the landfill materials, as well as construction of the cap. The plan shall include a proposal for locations of sampling, the numbers of samples to be taken and the methods for sampling and analysis. The plan shall also allow for a detailed analysis of air exposure pathways;

c. Landfill Gas. A plan for sampling landfill gas emission rates so that a determination can be made by EPA as to whether the landfill gas emission venting system that will be constructed should be active or passive;

d. Surface Water. A plan for sampling and analyzing on-Site and downstream surface water, before and after cap construction activities, to determine the effects of the cap on surface water conditions and drainage channels;

e. Residential Wells. A plan for sampling area residential wells;

2. Schedules for performance of the above;
3. Methods for performance of the above;
4. An overall Site Management Plan, which shall include identification of proposed contractors and subcontractors and their respective responsibilities for performance of remedial design activities and sampling, analysis and monitoring and investigation activities required by this Order and the curricula vitae of the contractors and subcontractors and key personnel within those organizations who are to perform Work at the Site pursuant to this Order. If performance of any subsequent phase of the Work required herein necessitates alteration of the Site Management Plan, or if Respondents retain different contractors or subcontractors for performance of later phases of the Work, Respondents shall, prior to the commencement of work by those contractors or subcontractors, submit to EPA proposed amendments to the Site Management Plan, which, upon approval by EPA, shall be deemed incorporated into and made an enforceable part of this Order;
5. A Quality Assurance/Quality Control ("QA/QC") Plan, which is prepared in accordance with Section XVII of this Order. The QA/QC Plan shall address sampling at the Site and analyses at both on-Site and off-Site laboratories. If performance of any subsequent phase of the Work required herein necessitates alteration of the QA/QC Plan, Respondents shall submit to EPA proposed amendments to the QA/QC Plan. Upon approval by EPA, any such amendments shall be deemed incorporated into and made an enforceable part of this Order;
6. A Health and Safety Plan, which shall satisfy the requirements of 29 C.F.R. § 1910.120 and EPA's Standard Operating Safety Guides (OSWER, 1988). If performance of any subsequent phase of the Work required herein necessitates alteration of the Health and Safety Plan, Respondents shall submit to EPA proposed amendments to the Health and Safety Plan. Upon approval by EPA, any such amendments shall be deemed incorporated into and made an enforceable part of this Order;
7. A Contingency Plan. If performance of any subsequent phase of the Work required herein necessitates alteration of the Contingency Plan, Respondents shall submit to EPA, for review and approval, proposed amendments to the Contingency Plan. Upon approval by EPA, any such amendments shall be deemed incorporated into and made an enforceable part of this Order; and

8. A plan for obtaining access approvals and satisfaction of permitting requirements, to the extent applicable.

B. The RD Work Plan shall also include plans and schedules for completion of the following:

1. A preliminary design report. The preliminary design report shall include, at a minimum, the following:

- a. Design criteria;
- b. A project delivery strategy;
- c. Preliminary plans, drawings and sketches;
- d. Required specifications in outline form; and
- e. A preliminary construction schedule.

EPA will either approve the preliminary design report or will require modifications of it in accordance with the procedures set forth in Section XV, hereof;

2. An intermediate design report. The intermediate design report shall be a continuation of and expansion of the preliminary design and shall include the results of any field sampling. EPA will either approve the intermediate design report or will require modifications of it in accordance with the procedures set forth in Section XV, hereof;

3. A final design report. The final design report shall include, at a minimum, the following:

- a. Final plans and specifications;
- b. A Construction Quality Assurance Project Plan ("CQAPP"). The CQAPP shall detail the approach to quality assurance during construction and operation and maintenance ("O&M") activities at the Site and shall specify a quality assurance official, independent of the Supervising Contractor, to conduct a quality assurance program during the construction phase of the project;
- c. A Field Monitoring Plan;
- d. A final construction cost estimate;
- e. A plan for implementation of construction; including, but not limited to, review of shop drawings to confirm consistency with the EPA-approved RD Work Plan, construction oversight, photographic documentation, and the submission of engineering drawings depicting the constructed facility;
- f. A Sampling, Analysis and Monitoring Plan for

sampling, analysis, and testing and monitoring to be performed during the remedial construction phase of the Work;

g. A Health and Safety Plan for the Remedial Action;

h. A Contingency Plan for the Remedial Action;

i. A plan for a wetlands assessment and cultural resources survey;

j. A draft Operation and Maintenance ("O&M") Plan; and

k. A proposed schedule for implementing all of the above.

EPA will either approve the final design report or will require modifications of it in accordance with the procedures set forth in Section XV, hereof. The approved final design report shall be deemed the Remedial Design Report (the "RD Report"), and shall be deemed incorporated into and an enforceable part of this Order.

C. EPA will either approve the RD Work Plan, or will require modifications of it in accordance with the procedures set forth in Section XV, below. Upon approval by EPA, the RD Work Plan shall be deemed incorporated into and become enforceable under this Order.

D. Respondents shall perform the RD (and other activities called for by the RD Work Plan) in conformance with the EPA-approved RD Work Plan (including the schedules contained therein) and the requirements of this Order.

REMEDIAL ACTION

41. Construction

A. Within sixty (60) days of Respondents' receipt of EPA's statement of approval of the RD Report, Respondents shall complete contractor procurement and initiate construction of the Remedial Action and shall thereafter perform and complete such construction in conformance with the EPA-approved RD Report, the schedule contained therein, and the requirements of this Order. Unless otherwise directed by EPA, Respondents shall not commence field activities until approval by EPA of the RD Report.

B. Pursuant to the schedule in the EPA-approved RD Report, Respondents shall complete construction. Within sixty (60) days of completion of construction, Respondents shall submit to EPA "as-built" engineering drawings which depict the closure cap constructed pursuant to this Order.

42. Pre-Final Inspection

A. At least 14 days prior to completion of the Remedial Action, Respondents and their contractor(s) shall be available to accompany EPA personnel or their representatives on a pre-final inspection. The pre-final inspection shall consist of a walk-through of the Site to determine the completeness of the Remedial Action and its consistency with the RD Report, this Order and applicable federal, state and local laws, rules and regulations.

B. Following the pre-final inspection, EPA will, as appropriate, either specify necessary corrective measures to fully and properly implement the Remedial Action or will determine that construction is complete. If EPA requires corrective measures to fully and properly implement the Remedial Action, Respondents shall submit a corrective measures schedule and plan to EPA for approval and shall undertake the corrective measures in accordance with the schedule and plan approved by EPA. Within fourteen (14) days after completion of the corrective measures, Respondents and their contractor(s) shall be available to accompany EPA personnel or their representatives on an inspection, as provided for in the preceding paragraph. Said inspection will be followed by further directions and/or notifications by EPA as provided above in this paragraph.

43. Operation and Maintenance

A. Prior to the final inspection, Respondents shall submit to EPA an O&M Manual which shall supplement the O&M Plan submitted pursuant to Paragraph 40, above, by addressing the O&M requirements for the facility as actually constructed. This O&M Manual shall conform to the EPA Guidelines contained in "Considerations for Preparation of Operation and Maintenance Manuals," EPA 68-01-0341, and any amendments thereto, and shall provide plans for long-term monitoring.

B. EPA will either approve the O&M Manual or will require modifications of it in accordance with the procedures set forth in Section XV hereof. Respondents shall perform O&M (and any other activities called for by the O&M Manual) in conformance with the O&M Manual (including the schedules contained therein), the OUI ROD and the requirements of this Order.

REMEDIAL ACTION REPORT

44. Within 30 days after receiving a notice from EPA to proceed with development of a Remedial Action Report, Respondents shall submit a Draft Remedial Action Report. The Draft Remedial Action Report shall include:

A. A Notice of Completion indicating that the Remedial Action has been completed in compliance with the requirements of the EPA-approved RD Report, the ROD and this Order, including the attached Statement of Work;

B. The Draft Remedial Action Report shall also include the following:

1. Verification that all remedial equipment has been decontaminated, dismantled and removed from the Site;
2. Documentation that all other terms or specifications contained in the RD Report, as well as the Performance Standards, have been met in accordance with this Order;

3. A certification statement, signed by a responsible corporate official of one or more of the Respondents, which states the following:

"I certify that the information contained in or accompanying this submission is true, accurate and complete."

4. A certification by a qualified professional engineer licensed by the State of New York that the Remedial Action has been completed in conformance with the requirements of the RD Report and this Order.

C. EPA will either approve the Draft Remedial Action Report, thus making it the Final Remedial Action Report, require modifications of it in accordance with the procedures set forth in Section XV, below, and/or require corrective measures to fully and properly implement the Remedial Action. If EPA requires corrective measures to the Remedial Action, Respondents shall undertake the corrective measures according to a schedule approved by EPA. Such corrective measures, if any, shall be followed by an inspection, further notification(s) by EPA, and submittal by Respondents of a revised Draft Remedial Action Report to EPA, in accordance with this paragraph.

XI. FAILURE TO ATTAIN PERFORMANCE STANDARDS

45. In the event that EPA determines that additional response activities are necessary to meet applicable Performance Standards, EPA may notify Respondents that additional response actions are necessary.

46. Unless otherwise stated by EPA, within thirty (30) days of receipt of notice from EPA that additional response activities are necessary to meet any applicable Performance Standards, Respondents shall submit for approval by EPA a work plan for the

additional response activities. The plan shall conform to the applicable requirements of Sections X, XVII, and XVIII of this Order. Upon EPA's approval of the plan pursuant to Section XV, Respondents shall implement the plan for additional response activities in accordance with the provisions and schedule contained therein.

XII. EPA PERIODIC REVIEW

47. Under Section 121(c) of CERCLA, 42 U.S.C. § 9621(c), and any applicable regulations, EPA may review the Site to assure that the Work performed pursuant to this Order adequately protects human health and the environment. Until such time as EPA certifies completion of the Work, Respondents shall conduct the requisite studies, investigations, or other response actions as determined necessary by EPA in order to permit EPA to conduct the review under Section 121(c) of CERCLA. As a result of any review performed under this paragraph, Respondents may be required to perform additional Work or to modify Work previously performed.

XIII. ADDITIONAL RESPONSE ACTIONS

48. EPA may determine that in addition to the Work identified in this Order and attachments to this Order, additional response activities may be necessary to protect human health and the environment. If EPA determines that additional response activities are necessary, EPA may require Respondents to submit a work plan for additional response activities. EPA may also require Respondents to modify any plan, design, or other deliverable required by this Order, including any approved modifications.

49. Not later than thirty (30) days after receiving EPA's notice that additional response activities are required pursuant to this Section, Respondents shall submit a work plan for the response activities to EPA for review and approval in accordance with Section XV below. Upon approval by EPA, the work plan is incorporated into this Order as a requirement of this Order and shall be an enforceable part of this Order. Upon approval of the work plan by EPA, Respondents shall implement the work plan according to the standards, specifications, and schedule in the approved work plan. Respondents shall notify EPA of their intent to perform such additional response activities within seven (7) days after receipt of EPA's request for additional response activities.

XIV. ENDANGERMENT AND EMERGENCY RESPONSE

50. In the event of any action or occurrence during the performance of the Work which causes or threatens to cause a release of a hazardous substance or which may present an

immediate threat to public health or welfare or the environment, Respondents shall immediately take all appropriate action to prevent, abate, or minimize the threat, and shall immediately notify the RPM or, if the RPM is unavailable, the Chief of the New York/Caribbean Superfund Branch I of the Emergency and Remedial Response Division of EPA Region II. Respondents shall take such action in consultation with the RPM and in accordance with all applicable provisions of this Order, including but not limited to the Health and Safety Plan.

51. Nothing in the preceding paragraph shall be deemed to limit any authority of the United States to take, direct, or order all appropriate action to protect human health and the environment or to prevent, abate, or minimize an actual or threatened release of hazardous substances on, at, or from the Site.

XV. EPA REVIEW OF SUBMISSIONS

52. After review of any deliverable, plan, report or other item which is required to be submitted for review and approval pursuant to this Order, EPA may: (a) approve the submission; (b) approve the submission with modifications; (c) disapprove the submission and direct Respondents to re-submit the document after incorporating EPA's comments; or (d) disapprove the submission and assume responsibility for performing all or any part of the response action. As used in this Order, the terms "approval by EPA," "EPA approval," or a similar term means the action described in subparagraphs (a) or (b) of this paragraph.

53. In the event of approval or approval with modifications by EPA, Respondents shall proceed to take any action required by the plan, report, or other item, as approved or modified by EPA.

54. Upon receipt of a notice of disapproval or a request for a modification, Respondents shall, within twenty-one (21) days or such other time as may be specified by EPA in its notice of disapproval or request for modification, correct the deficiencies and resubmit the plan, report, or other item for approval. Notwithstanding the notice of disapproval, or approval with modifications, Respondents shall proceed, at the direction of EPA, to take any action required by any non-deficient portion of the submission.

55. If upon the first resubmission or upon any subsequent resubmission, the plan, report or other item is disapproved by EPA, Respondents shall be deemed to be out of compliance with this Order. In the event that a resubmitted plan, report or other item, or portion thereof, is disapproved by EPA, EPA may again require that Respondents correct the deficiencies, in accordance with the preceding paragraphs of this Section. In addition, or in the alternative, EPA retains the right to amend or develop the plan, report or other item.

56. All plans, reports, and other submittals required to be submitted to EPA under this Order shall, upon approval by EPA, be deemed to be incorporated in and an enforceable part of this Order. In the event EPA approves a portion of a plan, report, or other item required to be submitted to EPA under this Order, the approved portion shall be deemed to be incorporated in and an enforceable part of this Order.

XVI. REPORTING REQUIREMENTS

57. A. In addition to any other requirement of this Order, Respondents shall prepare and provide to EPA written monthly progress reports which: (1) describe the actions which have been taken toward achieving compliance with this Order during the previous month; (2) include all results of sampling and tests and all other data received by Respondents during the previous month in the implementation of the Work; (3) describe all actions, data and plans which are projected to be commenced or completed during the next month and provide other information relating to the progress of design and construction as is customary in the industry; (4) include information regarding percentage of completion, all delays encountered or anticipated that may affect the future schedule for completion of the Remedial Action, and a description of all efforts made to mitigate those delays or anticipated delays. These reports are to be submitted to EPA by the tenth day of every month following the effective date of this Order.

B. If the date for submission of any item or notification required by this Order falls upon a weekend or State or Federal holiday, the time period for submission of that item or notification is extended to the next working day following the weekend or holiday.

C. Upon the occurrence of any event during performance of the Work which, pursuant to Section 103 of CERCLA, requires reporting to the National Response Center, Respondents shall, within twenty-four (24) hours, orally notify the EPA RPM, or, in the event of the unavailability of the EPA RPM, the Chief of the New York/Caribbean Superfund Branch I of the Emergency and Remedial Response Division of EPA Region II, in addition to the reporting required by Section 103. Within twenty (20) days of the onset of such an event, Respondents shall furnish EPA with a written report setting forth the events which occurred and the measures taken, and to be taken, in response thereto.

D. All reports and other documents submitted by Respondents to EPA (other than the monthly progress reports discussed above) which purport to document Respondents' compliance with the terms of this Order shall be signed by a responsible corporate official of one or more of the Respondents.

XVII. QUALITY ASSURANCE, SAMPLING AND DATA ANALYSIS

58. Any QA/QC plan(s) submitted by Respondents pursuant to this Order shall be completed in accordance with the most updated versions of: EPA publication "Test Methods for Evaluating Solid Wastes" ("SW-846") (November, 1986), the "Region II CERCLA Quality Assurance Manual" (October 1989), and the EPA documents entitled "Interim Guidelines and Specifications for Preparing Quality Assurance Project Plans" (QAMS-005/80) and "Guidance for Preparation of Combined Work/Quality Assurance Project Plans for Environmental Monitoring" (USEPA, Office of Water Regulations and Standards, May 1984), or any revised versions thereof.

59. Respondents shall use QA/QC procedures in accordance with the QA/QC Plan(s) submitted and approved by EPA pursuant to this Order, and shall use standard EPA Chain of Custody procedures, as set forth in the National Enforcement Investigations Center Policies and Procedures Manual (November 1984), the National Enforcement Investigations Center Manual for the Evidence Audit (September 1981), and Section 1.3 of SW-846, or any amended versions thereof, while conducting all sample collection and analysis activities required pursuant to this Order. To provide quality assurance and maintain quality control, Respondents shall:

A. Ensure that all contracts with laboratories used by Respondents for the analysis of samples taken pursuant to this Order provide for access of EPA personnel and EPA-authorized representatives to assure the accuracy of laboratory results related to the Site;

B. Ensure that the laboratories utilized by Respondents for the analysis of samples taken pursuant to this Order perform all analyses according to accepted EPA methods. Accepted EPA methods consist of those methods which are documented in the "Contract Lab Program Statement of Work for Inorganic Analysis" dated July, 1988 and the "Contract Lab Program Statement of Work for Organic Analysis", dated February 1989, and any amendments made thereto during the course of the implementation of this Order;

C. Ensure that all laboratories used by Respondents for analysis of samples taken pursuant to this Order participate in an EPA or EPA-equivalent QA/QC program;

D. Ensure that the laboratories used by Respondents for the analysis of samples taken pursuant to this Order analyze samples that EPA may submit to those laboratories for purposes of insuring that the laboratories meet EPA-approved QA/QC requirements.

60. Respondents shall notify EPA not less than fourteen (14) days in advance of any sample collection activity. At the request of EPA, Respondents shall allow split or duplicate

samples to be taken by EPA or its authorized representatives, of any samples collected by Respondents with regard to the Site or pursuant to the implementation of this Order. In addition, EPA shall have the right to take any additional samples that EPA deems necessary.

XVIII. COMPLIANCE WITH APPLICABLE LAWS

61. All activities by Respondents pursuant to this Order shall be performed in accordance with the requirements of all Federal and State laws and regulations. EPA has determined that the activities contemplated by this Order are consistent with the National Contingency Plan.

62. Except as provided in Section 121(e) of CERCLA and the NCP, no permit shall be required for any portion of the Work conducted entirely on-Site. Where any portion of the Work requires a Federal or State permit or approval, Respondents shall submit timely applications and take all other actions necessary to obtain and to comply with all such permits or approvals.

63. This Order is not, and shall not be construed to be, a permit issued pursuant to any Federal or State statute or regulation.

64. A. All off-Site transfer, treatment, storage, or disposal of Waste Material by Respondents must be in compliance with the applicable requirements of the Resource Conservation and Recovery Act, ("RCRA") 42 U.S.C. §6901, et seq., Section 121(d)(3) of CERCLA, 42 U.S.C. §9621(d)(3), the Toxic Substances Control Act, 15 U.S.C. §2601, et seq., as well as their implementing regulations, and all other applicable laws, including, but not limited to, 40 CFR Parts 262 and 263 and 6 NYCRR Part 372. Furthermore, Respondents shall provide notice to EPA of any facilities that Respondents propose to use for such off-Site transfer, storage, treatment, or disposal at least five (5) business days prior to the commencement of any such use, and shall obtain approval by EPA's RPM of the use of such facilities. Any and all off-Site disposal activities conducted by Respondents under this Order shall be performed in conformance with the NCP, and any amendments thereto, and Revised Procedures for Planning and Implementing Off-site Response Actions (U.S. EPA Office of Solid Waste and Emergency Response, November 13, 1987), and any amendments thereto.

B. If Waste Material from the Site is to be shipped to a waste management facility outside of New York State, Respondents shall provide prior written notification to the appropriate State environmental official in the receiving facility's state (with a copy to the EPA RPM) of such shipment of Waste Material. However, this notification requirement shall not apply to any off-Site shipments when the total volume of all such shipments will not exceed 10 cubic yards. Respondents shall

include in the written notification the following information: (i) the name and location of the facility to which the Waste Material is to be shipped; (ii) the type and quantity of the Waste Material to be shipped; (iii) the expected schedule for the shipment of the Waste Material; and (iv) the method of transportation. Respondents shall provide such notification to the receiving facility's state and to EPA in writing as soon as practicable, but in any event at least ten (10) business days prior to the said shipments. Respondents shall notify the receiving facility's state of major changes in their shipment plan, such as a decision to ship the Waste Material to another facility within the same state.

XIX. REMEDIAL PROJECT MANAGER, NOTIFICATION

65. EPA has designated the following individual as its RPM for the Site:

Julia Allen
New York/Caribbean Superfund Branch I
Emergency and Remedial Response Division
U.S. Environmental Protection Agency
Region II
26 Federal Plaza, Room 29-102
New York, N.Y. 10278
(212) 264-8476

66. EPA has the unreviewable right to change its RPM. If EPA changes its RPM, EPA will inform Respondents in writing of the name, address, and telephone number of the new Remedial Project Manager.

67. The RPM shall have the authority lawfully vested in a RPM and On-Scene Coordinator by the NCP. The RPM shall have authority, consistent with the NCP, to halt any work required by this Order and to take any necessary response action.

68. Within ten (10) days after the effective date of this Order, Respondents shall designate a Project Coordinator and shall submit the name, address, telephone number, qualifications and job title of the Project Coordinator to EPA for review and approval. Respondents' Project Coordinator shall be responsible for overseeing Respondents' implementation of this Order. If Respondents wish to change their Project Coordinator, Respondents shall provide written notice to EPA five (5) days prior to changing the Project Coordinator, identifying the name and qualifications of the new Project Coordinator. Respondents' selection of a Project Coordinator shall be subject to EPA approval.

69. All plans, reports, notices and other documents required to be submitted to EPA under this Order shall be

directed to the following individuals at the addresses specified below:

1 copy: Chief, New York/Caribbean Superfund Branch
Office of Regional Counsel
U.S. Environmental Protection Agency, Region II
Room 437
26 Federal Plaza
New York, New York 10278

Attention: Warwick Landfill Superfund Site Attorney

2 copies (or 10 copies if such communication is a plan or report):

Chief, New York/Caribbean Superfund Branch I
Emergency and Remedial Response Division
U.S. Environmental Protection Agency, Region II
26 Federal Plaza, Rm. 29-102
New York, N.Y. 10278

Attention: Warwick Landfill Superfund Site
Project Manager

70. In addition, when submitting to EPA any written communication required hereunder, Respondents shall simultaneously submit 2 copies of that communication (unless the given document is a plan or report, in which case 7 copies shall be submitted) to:

Director, Division of Hazardous Waste Remediation
New York State Department of Environmental
Conservation
50 Wolf Road
Albany, New York 12233-7010

Attention: Warwick Landfill Superfund Site
Project Manager

XX. COMMUNITY RELATIONS

71. Respondents shall cooperate with EPA in providing information regarding the Work to the public. As requested by EPA, Respondents shall participate in the preparation of such information for distribution to the public and in public meetings which may be held or sponsored by EPA to explain activities at or relating to the Site.

XXI. SITE ACCESS AND DATA/DOCUMENT AVAILABILITY

72. A. Respondents shall allow EPA and its authorized representatives, including contractors and subcontractors, to enter and freely move about all property at the Site for purposes of monitoring the progress of activities taking place, verifying any data or information submitted to EPA, conducting investigations relating to contamination or conditions at the Site, obtaining samples at the Site, inspecting and copying records, operating logs, contracts, or other documents required to assess Respondents' compliance with the Order, or for any other purpose reasonably related to EPA's oversight of the implementation of this Order. Respondents shall allow EPA and its authorized representatives to enter the Site, to inspect and copy all records, files, photographs, documents, sampling and monitoring data, and other writings related to work undertaken in carrying out this Order. Nothing herein shall be interpreted as limiting or affecting EPA's right of entry or inspection authority under Federal law.

B. To the extent that any area where Work is to be performed hereunder is presently owned by parties other than Respondents, Respondents shall use their best efforts to obtain access agreements from the present owners within forty-five (45) days of the effective date of this Order for purposes of implementing the requirements of this Order. Such agreements shall provide access not only for Respondents, but also for EPA and its authorized representatives or agents, as well as DEC and its authorized representatives or agents. Such agreements shall specify that Respondents are not EPA's representatives with respect to liability associated with Site activities. If such access agreements are not obtained by Respondents within the time period specified herein, Respondents shall immediately notify EPA of their failure to obtain access, and shall include in that notification a summary of the steps Respondents have taken to attempt to obtain access. Subject to the United States' non-reviewable discretion, EPA may use its legal authorities to obtain access for Respondents, may perform those response actions with EPA contractors at the property in question, or may terminate the Order if Respondents cannot obtain access agreements. If EPA performs those tasks or activities with contractors and does not terminate the Order, Respondents shall perform all other activities not requiring access to that property. Respondents shall integrate the results of any such tasks undertaken by EPA into their reports and deliverables.

73. Respondents may assert a claim of business confidentiality covering part or all of the information submitted to EPA pursuant to the terms of this Order under 40 C.F.R. § 2.203, provided such claim is not inconsistent with Section 104(e)(7) of CERCLA, 42 U.S.C. § 9604(e)(7), or other provisions of law. This claim shall be asserted in the manner described by

40 C.F.R. § 2.203(b) and substantiated by Respondents at the time the claim is made. Information determined to be confidential by EPA will be given the protection specified in 40 C.F.R. Part 2. If no such claim accompanies the information when it is submitted to EPA, it may be made available to the public by EPA or the State without further notice to Respondents. Respondents shall not assert confidentiality claims with respect to any data related to Site conditions, sampling, or monitoring.

74. Respondents shall maintain for the period during which this Order is in effect an index of documents that Respondents claim contain confidential business information. The index shall contain, for each document, the date, author, addressee, and subject of the document. Upon written request from EPA, Respondents shall submit a copy of the index to EPA.

XXII. RECORD PRESERVATION

75. Respondents shall provide to EPA upon request, copies of all documents and information within their possession and/or control or that of their contractors or agents relating to activities at the Site or to the implementation of this Order, including but not limited to, sampling, analysis, chain of custody records, manifests, trucking logs, receipts, reports, sample traffic routing, correspondence, or other documents or information related to the Work. Respondents shall also make available to EPA, for purposes of investigation, information gathering, or testimony, their employees, agents, or representatives with knowledge of relevant facts concerning the performance of the Work.

76. Until ten (10) years after EPA provides notice pursuant to paragraph 93, below, of the satisfactory completion of the Work, Respondents shall preserve and retain, and shall instruct their contractors, subcontractors, and anyone else acting on Respondents' behalf with respect to the Site to preserve and retain all records, documents, and information of whatever kind, nature, or description now in their possession or control or which come into their possession or control that relate in any manner to the Site or the Work conducted at the Site. At the conclusion of this document retention period, Respondents shall notify EPA at least ninety (90) days prior to the destruction of any such records, documents or information, and upon request by EPA, Respondents shall deliver all such records, documents and information to EPA.

XXIII. DELAY IN PERFORMANCE

77. Any delay in performance of this Order that, in EPA's judgment, is not properly justified by Respondents under the terms of this Section shall be considered a violation of this Order. Any delay in performance of this Order shall not affect

Respondents' obligations to perform all obligations fully under the terms and conditions of this Order.

78. Respondents shall notify EPA of any delay or anticipated delay in performing any requirement of this Order. Such notification shall be made by telephone to EPA's RPM within forty-eight (48) hours after Respondents first knew or should have known that a delay might occur. Respondents shall adopt all reasonable measures to avoid or minimize any such delay. Within five (5) business days after notifying EPA by telephone, Respondents shall provide written notification fully describing the nature of the delay, any justification for the delay, any reason why Respondents should not be held strictly accountable for failing to comply with any relevant requirements of this Order, the measures planned and taken to minimize the delay, and a schedule for implementing the measures that have been or will be taken to mitigate the effect of the delay. Increased costs or expenses associated with implementation of the activities called for in this Order is not a justification for any delay in performance.

XXIV. ASSURANCE OF ABILITY TO COMPLETE WORK

79. Respondents shall demonstrate their ability to complete the Work required by this Order and to pay all claims that arise from the performance of the Work by obtaining and presenting to EPA within ninety (90) days of the effective date of this Order, one of the following; (1) a performance bond; (2) a letter of credit; (3) a guarantee by a third party; or (4) internal financial information to allow EPA to determine that Respondents have sufficient assets available to perform the Work. Respondents shall demonstrate financial assurance in an amount no less than the estimate of cost for the remedial design and remedial action contained in the Record of Decision for the Site. If Respondents seek to demonstrate ability to complete the remedial action by means of internal financial information, or by a guarantee of a third party, they shall resubmit such information annually, on the anniversary of the effective date of this Order. If EPA determines that such financial information is inadequate, Respondents shall, within thirty (30) days after receipt of EPA's notice of determination, obtain and present to EPA for approval one of the other three forms of financial assurance listed above.

80. At least seven (7) days prior to commencing any work at the Site pursuant to this Order, Respondents shall submit to EPA a certification that Respondents or their contractors and subcontractors have adequate insurance coverage or have indemnification for liabilities for injuries or damages to persons or property which may result from the activities to be conducted by or on behalf of Respondents pursuant to this Order. Respondents shall ensure that such insurance or indemnification is maintained for the duration of the Work

required by this Order.

XXV. UNITED STATES NOT LIABLE

81. The United States, by issuance of this Order, assumes no liability for any injuries or damages to persons or property resulting from acts or omissions by Respondents, or their directors, officers, employees, agents, representatives, successors, assigns, contractors, or consultants in carrying out any action or activity pursuant to this Order. Neither EPA nor the United States may be deemed to be a party to any contract entered into by Respondents or their directors, officers, employees, agents, successors, assigns, contractors, or consultants in carrying out any action or activity pursuant to this Order.

XXVI. ENFORCEMENT AND RESERVATIONS

82. EPA reserves the right to bring an action against Respondents under Section 107 of CERCLA, 42 U.S.C. § 9607, for recovery of any Response Costs incurred by the United States in connection with the Site. This reservation shall include but not be limited to past costs, future costs, direct costs, indirect costs, the costs of oversight, as well as accrued interest as provided in Section 107(a) of CERCLA.

83. Notwithstanding any other provision of this Order, at any time during the response action, EPA may perform its own studies, complete the response action (or any portion of the response action) as provided in CERCLA and the NCP, and seek reimbursement from Respondents for its costs, or seek any other appropriate relief.

84. Nothing in this Order shall preclude EPA from taking any additional enforcement actions, including modification of this Order or issuance of additional orders, and/or additional remedial or removal actions as EPA may deem necessary, or from requiring Respondents in the future to perform additional activities pursuant to CERCLA, or any other applicable law.

85. Notwithstanding any provision of this Order, the United States hereby retains all of its information gathering, inspection and enforcement authorities and rights under CERCLA, RCRA and any other applicable statutes or regulations.

86. Respondents shall be subject to civil penalties under Section 106(b) of CERCLA, 42 U.S.C. § 9606(b), of not more than \$25,000 for each day in which Respondents willfully violate, or fail or refuse to comply with this Order without sufficient cause. In addition, failure to properly carry out response actions under this Order, or any portion hereof, without sufficient cause, may result in liability under Section 107(c)(3) of CERCLA, 42 U.S.C. § 9607(c)(3), for punitive damages in an amount at least equal to, and not more than three times the

amount of any costs incurred by EPA as a result of such failure to take proper action.

87. Nothing in this Order shall constitute or be construed as a release from any claim, cause of action or demand in law or equity against any person for any liability it may have arising out of or relating in any way to the Site.

88. If a court issues an order that invalidates any provision of this Order or finds that Respondents have sufficient cause not to comply with one or more provisions of this Order, Respondents shall remain bound to comply with all provisions of this Order not invalidated by the court's order.

XXVII. EFFECTIVE DATE AND COMPUTATION OF TIME

89. This Order shall be effective eleven (11) days after receipt by Respondents, unless a conference is requested pursuant to paragraph 90, below. If such conference is timely requested, this Order shall become effective three (3) days following the date the conference is held, unless the effective date is modified by EPA. All times for performance of ordered activities shall be calculated from this effective date.

XXVIII. OPPORTUNITY TO CONFER

90. Respondents may, within ten (10) days after receipt of this Order, request a conference with EPA to discuss this Order. If requested, the conference shall occur within seven (7) days of Respondents' request for a conference.

91. The purpose and scope of the conference shall be limited to issues involving the implementation of the Work required by this Order and the extent to which Respondents intend to comply with this Order. This conference is not an evidentiary hearing, and does not constitute a proceeding to challenge this Order. It does not give Respondents a right to seek review of this Order, or to seek resolution of potential liability, and no official stenographic record of the conference will be made. At any conference held pursuant to Respondents' request, Respondents may appear in person or by an attorney or other representative.

92. Requests for a conference must be by telephone to Carol Y. Berns, Esq., Office of Regional Counsel, Region II, telephone (212) 264-9791, followed by written confirmation mailed that day to Ms. Berns and the RPM at the addresses set forth in Section XVIII of this Order.

XXIX. TERMINATION AND SATISFACTION

93. This Order will be terminated by EPA if Respondents demonstrate in writing and certify to the satisfaction of EPA

that all Work and activities required under this Order, including any additional work required by EPA, have been performed fully in accordance with this Order and EPA has approved the certification in writing. Such an approval by EPA, however, shall not relieve Respondents of any remaining obligations under the Order, including those requirements set forth in Section XXI regarding record preservation. Respondents' written submission under this paragraph shall include a sworn statement by a responsible corporate official(s) of one or more of the Respondents which states the following: "I certify that the information contained in or accompanying this submission is true, accurate and complete".

So Ordered, this 28 day of February, 1992.

BY: 

CONSTANTINE SIDAMON-ERISTOFF
Regional Administrator
U.S. Environmental Protection Agency